TOPOGRAPHIC SURVEY CONTROL POINT RECORD

STATION LONG NAME	MU10	
STATION NUMBER	MU10	
4 CHAR ID	MU10	
COUNTRY	IRAQ	
LOCATION	AL MUTHANNA	
SURVEYING AGENCY	IGRS	
DATE (OF DESCRIPTION)	08 JUL 2005	

CONTENTS	YES	NO	NO OF PAGES
FIELD COORDINATE VALUES	Х		1
OFFICE COORDINATE VALUES	Х		1
STATION MONUMENT & SITE DETAILS	Х		1
STATION DIAGRAM	Х		1
ACCESS MAP	Х		1
ACCESS DESCRIPTION	Х		1
APPROACH PHOTOGRAPHS	Х		1
CARDINAL POINT PHOTOGRAPHS	Х		2

RECORD OF VISITS

DATE OF VISIT	NAME	UNIT	REMARKS

ADDITIONAL DETAILS/ENCLOSURES

CONTENTS	NO OF PAGES

SECURITY CLASSIFICATION

FIELD COORDINATE VALUES

STATION LONG NAME	MU10
4 CHAR ID	MU10
STATION NUMBER	MU10

THIS STATION IS NEW	YES
IDENTICAL / NEARLY IDENTICAL WITH	N/A

FIELD VALUES FROM THE RECEIVER / HAND HELD GPS – IN WGS84

LATITUDE N/S	29'42"31 N	
LONGITUDE E/W	045'52"39 E	
HT (M)	+239	
GRID ZONE DESIGNATOR	38R	
UTM / MGRS GRID	38R NT 84883 86815	
SURVEYING AGENCY	IGRS	

FIELD INPUT BY: LCPL HARRIS- HUGHES	UNIT: IGRS	DATE: 08 JUL 2005
FIELD CHECKED BY: SGT MOSTAFA	UNIT: IGRS	DATE: 08 JUL 2005

PAGE 1 OF 9

OFFICE COORDINATE VALUES

WGS 84 ADJUSTED VALUES AS AT: 25 Aug 05

LATITUDE N	29° 42′ 30.81055′′
LONGITUDE E	045° 52' 38.95888''
SPHEROIDAL HT (M)	225.573
EGM96 GEOID MODEL HT (M)	-7.196
ORTHOMETRIC HT (M)	232.769
VERTICAL DATUM	WGS 84
GEOID MODEL USED	EGM 96
RELATIVE TO	CORS STATIONS
RELATIVE POSITION ACCURACY (M)	0.018
RELATIVE HEIGHT ACCURACY (M)	0.012
ADJUSTING AGENCY	OPUS
ADJUSTMENT DATE	25 AUG 2005

LOCAL DATUM VALUES AS AT: 25 Aug 05

SPHEROID	N/A
PROJECTION	N/A
GRID	N/A
VERTICAL DATUM	N/A
LATITUDE N/S	N/A
LONGITUDE E/W	N/A
EASTINGS (M)	N/A
NORTHINGS (M)	N/A
SPHEROIDAL HT (M)	N/A
ORTHOMETRIC HT (M)	N/A
GRID ZONE DESIGNATOR	N/A
TRANSFORMATION AGENCY	N/A
TRANSFORMATION DATE	N/A

GRAVITY VALUE: N/A	TYPE OF STN: N/A	REF: N/A	
AIR PHOTO: N/A	REF: N/A	SCALE: N/A	
IMAGERY: N/A	REF: N/A	SCALE: N/A	
		CONTENT OF THE PROPERTY OF THE	_

OFFICE INPUT BY: LCPL COWARD	UNIT: IGRS	DATE: 25 AUG 2005
OFFICE CHECKED BY: LCPL DICKEN	UNIT: IGRS	DATE: 25 AUG 2005

STATION MONUMENT AND SITE DETAILS

STATION LONG NAME: MU10

STATION NUMBER: MU10 4 CHAR ID: MU10

LOCATION: AL MUTHANNA COUNTRY: IRAQ

STATION ADDRESS: N/A

TEL: N/A FAX: N/A

LAND OWNER ADDRESS:

N/A

TEL: N/A FAX: N/A

TYPE OF MARK: HARN

CONDITION: GOOD

MARK SETTING: FINE MARK ON REBAR NO OF REBARS: 1

MONUMENT PHOTO / SKETCH



PREPARED BY: LCPL HARRIS-HUGHES	UNIT: IGRS	DATE: 08 JUL 2005
CHECKED BY: SGT MOSTAFA	UNIT: IGRS	DATE: 08 JUL 2005

PAGE 3 OF 9

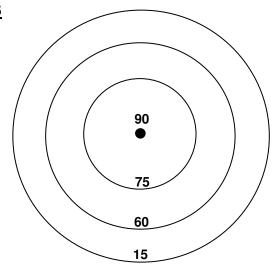
STATION DIAGRAM

STATION LONG NAME: MU10	
STATION NUMBER: MU10	4 CHAR ID: MU10

GPS NEEDED TO LOCATE POINT

NO	DESCRIPTION	BRG/HORZ ANGLE	DISTANCE
1			
2			
3			
4			

OBSCURITY DETAILS



PREPARED BY: LCPL HARRIS-HUGHES	UNIT: IGRS	DATE: 08 JUL 2005
CHECKED BY: SGT MOSTAFA	UNIT: IGRS	DATE: 08 JUL 2005

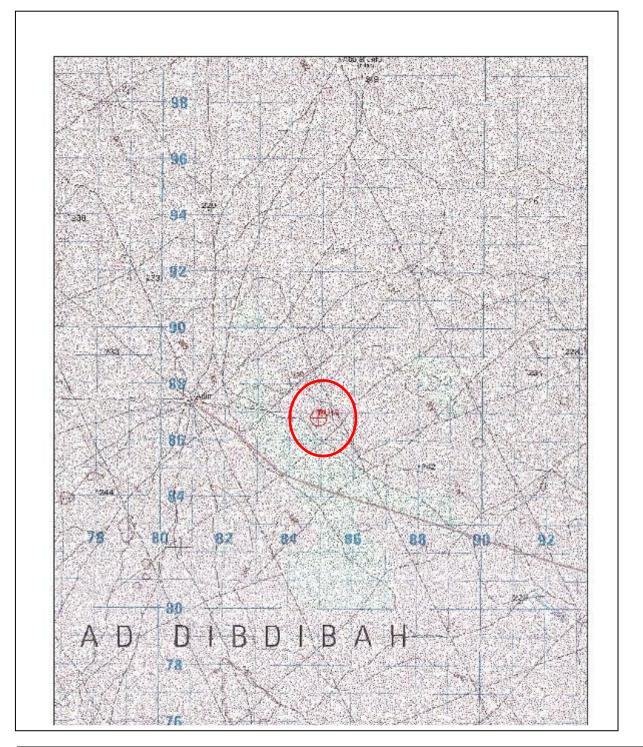
PAGE 4 OF 9

REVISION DATE: 05 FEB 98 TOPO FORM 01e

ACCESS MAP

STATION LONG NAME: MU10
STATION NUMBER: MU10
4 CHAR ID: MU10

MAP DETAILS	SERIES: K643	SHEET: 5149
EDITION: 1-DMA	SCALE: 1:100,000	GR: 38R NT 84883 86815



PREPARED BY: LCPL HARRIS- HUGHES	UNIT: IGRS	DATE: 08 JUL 2005
CHECKED BY: SGT MOSTAFA	UNIT: IGRS	DATE: 08 JUL 2005

ACCESS DESCRIPTION

STATION LONG NAME: MU10
STATION NUMBER: MU10
4 CHAR ID: MU10

MAP DETAILS	SERIES: K643	SHEET: 5149
EDITION: 1-DMA	SCALE: 1:100,000	GR: 38R NT 84883 86815

From major junction at GR 38R MU 595 815 proceed east for 104km, from there proceed south east for 75km to GR 38R NT 84883 86815.		
GPS is needed to locate point as it is in the middle of the desert.		

PREPARED BY: LCPL HARRIS-HUGHES	UNIT: IGRS	DATE: 08 JUL 2005
CHECKED BY: SGT MOSTAFA	UNIT: IGRS	DATE: 08 JUL 2005

REVISION DATE: 05 FEB 98 TOPO FORM 01g

APPROACH PHOTOGRAPHS

STATION LONG NAME: MU10

STATION NUMBER: MU10 4 CHAR ID: MU10

NEAR APPROACH FROM NORTH



FAR APPROACH FROM NORTH



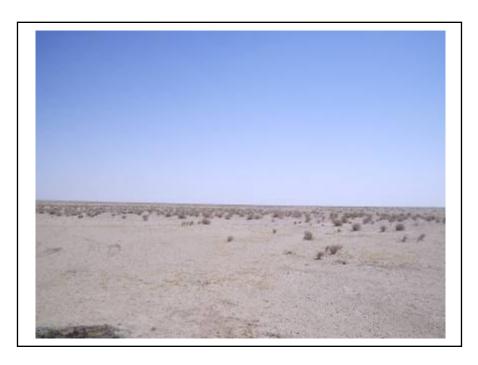
TAKEN BY: SGT MOSTAFA DATE TAKEN: 08 JUL 2005

CARDINAL PHOTOGRAPHS

STATION LONG NAME: MU10

STATION NUMBER: MU10 4 CHAR ID: MU10

NORTH



SOUTH



TAKEN BY: SGT MOSTAFA DATE TAKEN: 08 JUL 2005

CARDINAL PHOTOGRAPHS

STATION LONG NAME: MU10

STATION NUMBER: MU10 4 CHAR ID: MU10

EAST



WEST



TAKEN BY: SGT MOSTAFA DATE TAKEN: 08 JUL 2005

PAGE 9 OF 9

TOPO FORM 01k